Fig.3 Prevalence of InSTI TDRMs amongst 231 patients with non-B subtype HIV infection		
	2013-16	2017-19
Number of patients	125	106
Age (mean and SD)	36.8 (11)	38 (13)
CD4+ cell count/mm^3 (mean and SD)	383 (286)	355 (335)
CD4+ cell count percentage (mean and SD)	19 (11.4)	17,8 (11,8)
Plasma HIV RNA (copies/ml,mean and SD	718784 (2045027)	568033 (1713447)
Pts with wild type	108	94
Pts with NRTI	2	
Pts with NNRTI	14	11
Pts with PI	1	1
Pts with NRTI+NNRTI		
Pts with NRTI+PI		
Pts with NRTI+NNRTI+PI		
Pts with 157Q mutation	5 (1 with NNRTI)	3
Pts with 143C mutation	1	
Pts with 153F		1
Pts with 68IV	1	
Pts with 97A	20	5
Pts with 74IM	20 (1 with PI)	28
Pts with 119R	2	
Pts with 263K		1
138K		1
223		1
121 CFSY		1
Pts with 66IT mutation		1
Pts with 260I mutation	1	4

Disclosures. **All authors:** No reported disclosures.

2507. Transmitted and Acquired NNRTI Resistance in the Philippines: Are Newer Generation NNRTIs a Viable Option?

Nina Theresa Dungca, MSc[1]; Brian Schwem, PhD; Geraldine Arevalo, BS; Christian Francisco, MD[2]; Christine Penalosa-Ramos, MD[2]; Patrick Ching, MD[3]; Katerina Leyritana, MD[4]; Raul Destura, MD[3]; Jodor Lim, MD[2]; Rosario Tactacan-Abrenica, MD[5]; Elizabeth Telan, MD[6]; Rontgene Solante, MD, FIDSA[5]; Genesis Samonte, MD[7]; Lyka Trinidad, RN[7]; Kevin Mendoza, RN[7]; Marissa M. Alejandria, MD, MSc[8]; Edsel Maurice T. Salvana, MD, DTM&H, FIDSA; [1]Institute of Molecular Biology and Biotechnology, Manila, National Capital Region, Philippines; [2]University of the Philippines Manila, Manila, National Capital Region, Philippines; [3]University of the Philippines, Manila, National Capital Region, Philippines; [4]Sustained Health Initiatives of the Philippines, Manila, National Capital Region, Philippines; [5]San Lazaro Hospital, Manila, National Capital Region, Philippines; [6]STD AIDS Cooperative Laboraory, Manila, National Capital Region, Philippines; [7]Department of Health, Manila, National Capital Region, Philippines; [8]University of the Philippines Manila, National Institutes of Health, Manila, National Capital Region, Philippines

Session: 263. HIV: ART Resistance and Adherence
Saturday, October 5, 2019: 12:15 PM

Background. Doravirine, rilpivirine, and etravirine are newer generation non-nucleoside reverse transcriptase inhibitors (NNRTI) that are intended to be more durable alternatives to efavirenz and nevirapine. We examined transmitted drug resistance (TDR) and acquired drug resistance (ADR) to NNRTIs from recent local TDR and ADR data to determine whether these can be useful as first-line or second-line antiretroviral (ARV) agents.

Methods. We reanalyzed Sanger-Based sequences (SBS) from an ADR surveillance study; and SBS and near-whole-genome next-generation sequences (NGS) from a TDR surveillance study using the Stanford HIV Drug Resistance Database.

Results. ADR: Out of 513 Filipino PLHIV from an ADR surveillance study on one year of ARV treatment, 53 (10.3%) failed (HIV VL >1,000 copies/mL). Among these, 48 had clinically significant mutations. Table 1 shows NNRTI ADR frequencies. There was no significant ADR difference between first-generation and newer generation NNRTIs. TDR: 298 treatment-naïve Filipino PLHIV underwent baselines sequencing. All 298 had SBS. 266 had successful NGS. Table 1 shows SBS and NGS TDR NNRTI resistance at a 5% minor variant cutoff. There was no significant TDR difference between first-generation and newer generation NNRTIs.

Conclusion. ADR and TDR rates to the newer NNRTIs are similar to first-generation NNRTIs. High TDR to doravirine on NGS is concerning, but its clinical significance is unclear. Etravirine had the lowest TDR and ADR and may be the most useful new-generation NNRTI. However, integrase strand transfer inhibitor-based regimens will likely be more durable.

Table 1. ADR and TDR NNRTI resistance in the Philippines.

Antiretroviral	SBS ADR Resistance in those with clinically significant mutations (%) N=48/ among those failing treatment (%) N=53/ and overall (%) N=513	SBS TDR Resistance (%) among those with TDR N=18/ and overall (%) N=298	NGS TDR Resistance (%) among those with TDR N=45/ and overall (%) N=266
DOR	39 (81.3)/(73.6)/(7.6)	3 (16.7)/(1.0)	20 (44.4)/(7.5)
EFV	45 (93.8)/(84.8)/(8.8)	6 (33.3)/(2.0)	8 (17.8)/(3.0)
ETR	36 (75.0)/(68.0)/(7.0)	2 (11.1)/(0.7)	6 (13.3)/(2.3)
NVP	45 (93.8)/(84.9)/(8.8)	6 (33.3)/(2.0)	9 (20)/(3.4)
RPV	41 (85.4)/(77.3)/(8.0)	9 (50)/(3.0)	16 (35.6)/(6.0)
Any NNRTI	47 (97.9)/(88.7)/(9.2)	10 (55.6)/(3.4)	30 (66.7)/(11.3)

Disclosures. **All authors:** No reported disclosures.

2508. Virologic Suppression in Patients Switched to BIC/TAF/FTC with Baseline NRTI and/or INSTI Resistance

Kayla M. Natali, PharmD, AAHIVP[1]; Rahul Tilani, BA[2]; Jihad Slim, MD[1]; [1]Saint Michael's Medical Center, Montville, New Jersey; [2]University of New England College of Osteopathic Medicine, Newark, New Jersey

Session: 263. HIV: ART Resistance and Adherence
Saturday, October 5, 2019: 12:15 PM

Background. BIC/TAF/FTC is the first fixed-dose combination tablet to contain both a second-generation INSTI and TAF and has therefore become a popular treatment option for HIV. Historically, patients with NRTI mutations were placed on four-drug, NRTI-retaining regimens or two-drug, NRTI-sparing regimens. Recently, data have emerged supporting the use of second-generation INSTIs with tenofovir/FTC in the setting of the M184V mutation alone. There is a paucity of data, however, evaluating the use of BIC/TAF/FTC in the setting of NRTI and/or INSTI mutations. This study assessed the role of BIC/TAF/FTC in patients with baseline NRTI and/or INSTI mutations.

Methods. This was an observational retrospective study conducted at an inner city HIV clinic. Patients were eligible if they were switched to BIC/TAF/FTC with confirmed adherence and had either the M184V mutation alone, M184V plus another NRTI mutation(s), an INSTI mutation alone, or both NRTI and INSTI mutation(s) at the time of ART switch. We evaluated virologic response (HIV RNA < 200 copies/mL) and duration of BIC/TAF/FTC therapy.

Results. There were 16 patients eligible for analysis. Among the patients, 69% were male and 31% were female. The majority of patients were Black (81%). The mean age was 63 years (SD ± 8.6). Thirteen patients were virologically suppressed (HIV RNA < 200 copies/mL) at baseline. The mean CD4 count at baseline was 630.4 cells/mm^3 (SD ± 297.1). Mutations at baseline were as follows: M184V alone (25%), M184V plus another NRTI mutation(s) (56.25%), INSTI mutation alone (12.5%), NRTI and INSTI mutation(s) (6.25%). BIC/TAF/FTC mean duration of therapy was 10.5 months (range 6–14 months). The mean CD4 count of the patients switched to BIC/TAF/FTC was 687 cells/mm^3 (SD ± 20.7). All patients switched to BIC/TAF/FTC achieved or maintained virologic suppression (HIV RNA < 200 copies/mL) with a mean HIV RNA of 26.25 copies/mL (SD ± 14.1). Fifteen of those switched to BIC/TAF/FTC had an undetectable HIV RNA level (HIV RNA < 50 copies/mL).

Conclusion. While a larger cohort and longer follow-up period is needed, BIC/TAF/FTC may maintain virologic suppression in patients with select baseline NRTI and/or INSTI mutations.

Disclosures. **All authors:** No reported disclosures.

2509. Pooled Resistance Analyses of Darunavir (DRV) Once Daily (QD) Regimens and Formulations Across 10 Clinical Studies of Treatment-Naïve (TN) and Treatment-Experienced (TE) Patients with Human Immunodeficiency Virus (HIV)-1 Infection